

Science Courses

Ensuring that an appropriately prepared and endorsed teacher is assigned to teach in Michigan's classrooms is critical to student achievement. The State Board of Education (SBE) has [approved standards](#) for preparing teachers in each endorsement area.

The Science (DX) and Integrated Science (DI) are group endorsement areas, covering multiple subareas including biology, chemistry, physics, and earth/space science. The Physical Science (DP) is a group endorsement including chemistry and physics.

Assignments in the specific subareas of science can also be taught by holders of the specific subarea endorsement. For example, while the Science (DX) and Integrated Science (DI) endorsed teacher may be assigned to teach a biology course, so may a specific Biology (DA) endorsed teacher. However, the specific subarea endorsed teacher may not be assigned to teach a course covering multiple areas of science. The Chemistry (DC) teacher may not be assigned to teach "7th Grade Science" or "Physical Science". If the course covers multiple areas of science, the single subject area endorsed teacher has not been properly prepared.

There has been a certain amount of ambiguity regarding placements in physical science courses due to some content area overlap of chemistry and physics. On March 19, 2012, it was determined that new assignments to physical science courses must hold the Physical Science (DP), or Science (DX), or Integrated Science (DI), **or both** the Chemistry (DC) and Physics (DE) endorsements.

Physical science teachers who have been previously assigned to physical science courses prior to the 2012 school year with only Chemistry (DC) or Physics (DE) endorsement may continue in that assignment. Teachers who taught Physical Science prior to 2012 and have not been teaching it continuously since then can begin teaching it again with the DC or DE endorsement as long as the following guideline is followed:

- There must not be a lapse of three or more years from the time teacher moved from physical science assignment and the conclusion of the 2011-2012 school year. In other words, a teacher who left the physical science assignment before beginning of 2009-2010 school year should NOT be

reassigned to physical science for 2012-2013 school year. If three school years have passed since the teacher last taught physical science then the teacher will not be considered appropriately placed in a physical science course with only **one** of the Chemistry (DC) or Physics (DE) endorsements.

Under the No Child Left Behind Act of 2001 (NCLB) and SBE defined policy ([Michigan's Definition for Identifying Highly Qualified Teachers](#), December 6, 2005) teachers of core academic subject areas must meet the Highly Qualified (HQ) teacher requirements. All areas of science are considered core academic subject areas, therefore the [HQ requirements](#) do apply.

A passing score on either the Science or the Integrated Science Michigan Test for Teacher Certification (MTTC) demonstrates that a Science (DX) or Integrated Science (DI) endorsed teacher is Highly Qualified for all areas of science. A passing score on the Physical Science (DP) MTTC demonstrates the endorsed teacher is Highly Qualified for chemistry, physics and physical science courses.

Additional information regarding appropriate placement of teachers can be found in the [Quick Reference: Courses That Can Be Taught](#) and the [Proper Placement Considerations](#) documents.